

INSTRUCTIONS FOR USING THE PFAFF 60

FOREWORD

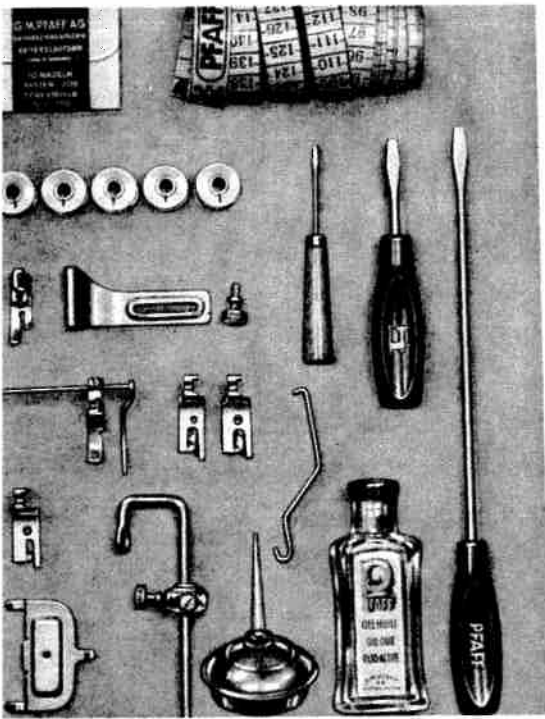
You are now the proud owner of a PFAFF 60 straight stitching machine. The material and workmanship which it embodies are of the same high standards as used in today's modern high speed sewing machines for industrial purposes.

Your PFAFF 60 is easy to operate, requiring but little attention and service. Just follow these simple instructions and sewing will become a lasting pleasure.

G · M · PFAFF A G

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2. What belongs to your machine ?

- 1 package of assorted needles
- 1 tape measure
- 5 bobbins No. 2030
- 1 shuttle screw driver No. 29070
- 1 screw driver No. 29002 short
- 1 screw driver No. 29007 long
- 1 hinged presser foot No. 43729
- 1 guide No. 25820
- 1 guide fastening screw No. 262
- 1 edge stitcher with quilting guide No.25553
- 1 hemmer, 2.5 mm, No. 25576
- 1 hemmer, 4.0 mm, No. 25579
- 1 folder No. 25594
- 1 reel holder No. 25869
- 1 feed cover plate No. 25997
- 1 oil can No.29018
- 1 bottle of oil No. 29180
- 1 accessory box No. 29032
- 1 instruction booklet
- 1 spanner No.30278 } with machines mounte
- 1 spanner No.29017 } on treadle stands

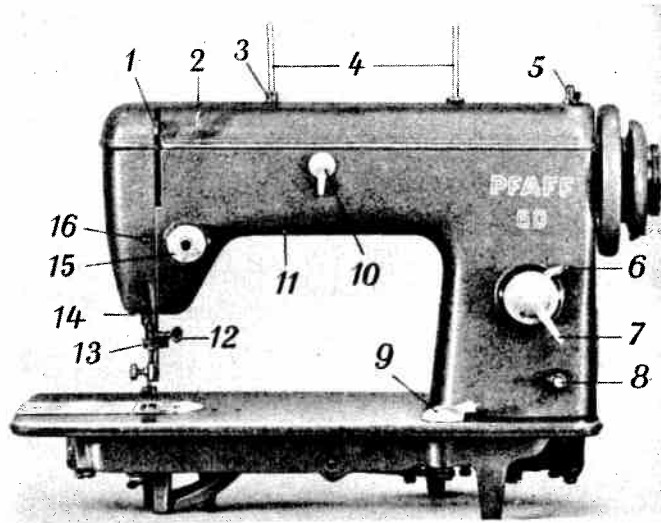
Note: Darning Attachment No. 53003

Photo 1 is furnished in lieu of 2

3. Do you know your machine?

Photo 2

- . Thread take-up
- . Upper thread guide
- . Winder thread tension
- . Fold-away reel pin
- . One-lever winder
- . Stitch length limitation lever
- . Stitch regulating lever
- . Push button for sew light
- . Feed lowering button
- . Bulb lowering lever
- . Sew light
- . Needle holder
- . Built-in needle threader
- . Lower face plate thread eyelet
- . Upper thread tension
- . Thread eyelet for upper face plate



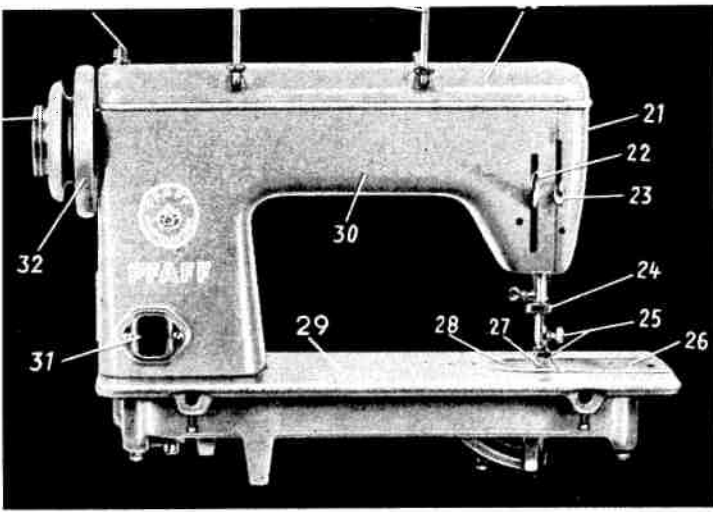


Photo 3

- 17. Milled screw
for engaging the sewing mechanism
- 18. Winder spindle
- 19. Fold-away reel pin
- 20. Removable top plate
- 21. Face plate
- 22. Presser bar lever
- 23. Needle threading lever
- 24. Thread cutter
- 25. Sewing foot
- 26. Bed plate slide
- 27. Feeder
- 28. Needle plate
- 29. Bed plate
- 30. Sewing machine arm
- 31. Socket for lamp cable
- 32. Balance wheel

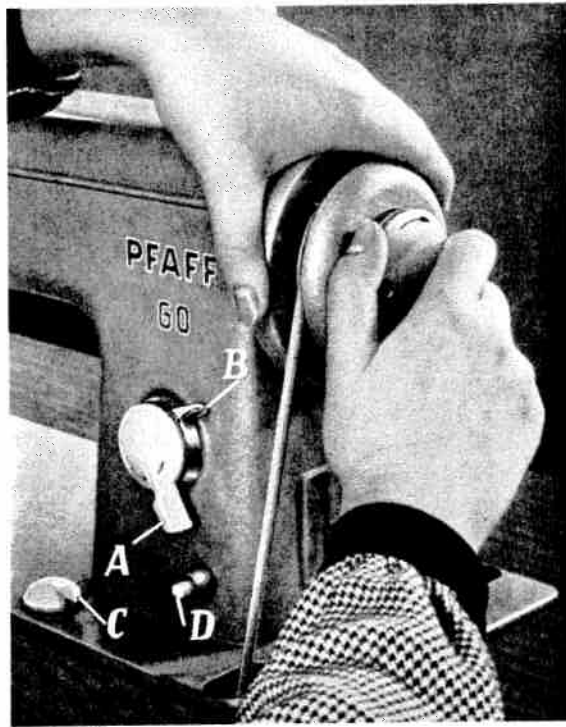
Operation of the Machine

To engage the sewing mechanism

Turn the balance wheel and tighten milled screw in the direction of arrow.

For winding, disengage sewing mechanism by turning that screw in opposite direction.

Photo 4



Type of material:	Needle No.	Type of thread:	Size:
Very fine linen,	60 (6)	cotton	100-120
Shirting, cambrics, mull		silk	000- 00
Net, finest silk		schappe silk	100-150
Foulard silk		embroidery yarn	60- 80
Fine linen, cambric	70 (7)	cotton	80-100
Crêpe de chine		silk	00- 0
Crêpe marocain		schappe silk	80-100
Crêpe satin, Nylon, Perlon		embroidery yarn	60- 70
Muslin, fine taffeta	80 (8)	cotton	70- 80
Fine sheets, table cloths,			
Silk cloths		silk	00- 0
Linen, calico, quilts with			(100/3)
Silk covers		schappe silk	70-80
Cotton, kid leather, etc.		embroidery yarn	50-70
Fine cloth	90 (9)	cotton	40-60
Heavy silk and linen, inlets		silk	A-B
Clothing generally		schappe silk	70
Fine leather		embroidery yarn	30-40
Heavy woollens	100 (10)	cotton thread	30-40
and linen		silk thread	B-C
Cloth, calico, etc.	110 (11)	embroidery yarn	30-40

. To change the needle:

loosen needle clamp screw.

Insert needle into the opening of the needle bar as far as will go, taking care that the flattened side of the shank faces to the right.

Tighten needle clamp screw.



Photo 5

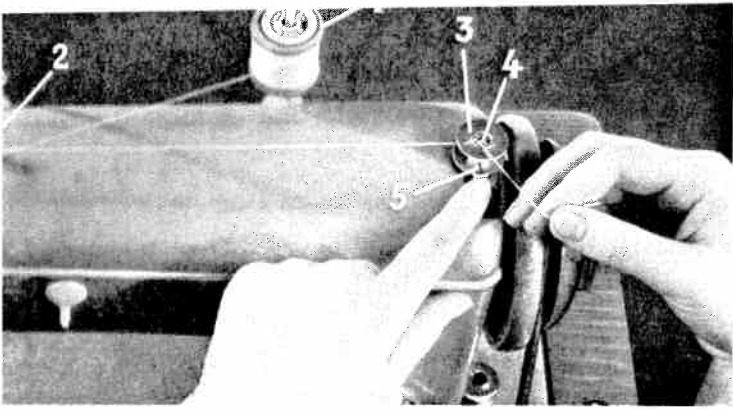


Photo 6

**7. To wind the
under thread**

1. Disengage the sewing mechanism.
2. Put cotton reel on the right hand reel pin.
3. Pass the thread from cotton reel 1, carrying it through tension 2, as above shown.
4. Thread one end inside-out through the bobbin slot.
5. Put bobbin 3 on spindle 4.
6. Press lever 5 against bobbin. The winder will throw off automatically when bobbin is filled.

To take off the bobbin case.

raise needle.

pull out bobbin case, holding it by the latch.

While the latch remains open, the bobbin cannot fall out.

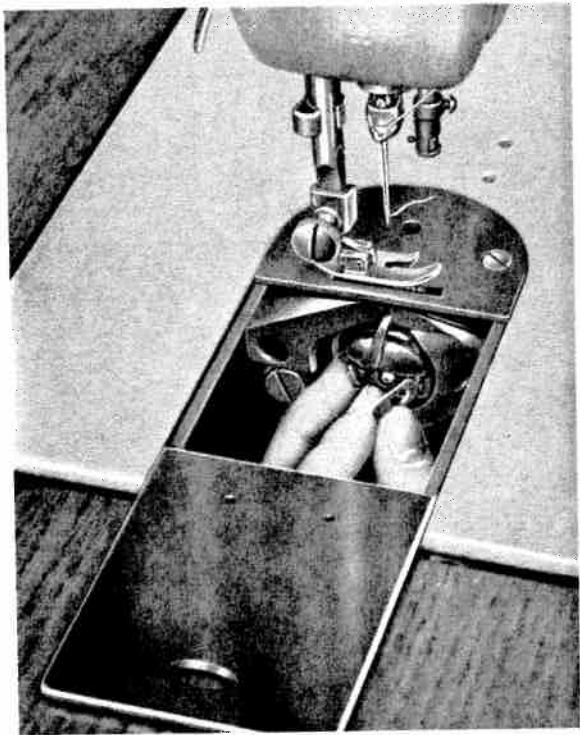


Photo 7



9. To insert the bobbin
in the bobbin case.



Proceed as shown in the photo, thread
end to face operator.

Photo 8

raw thread through slot, as illustrated.

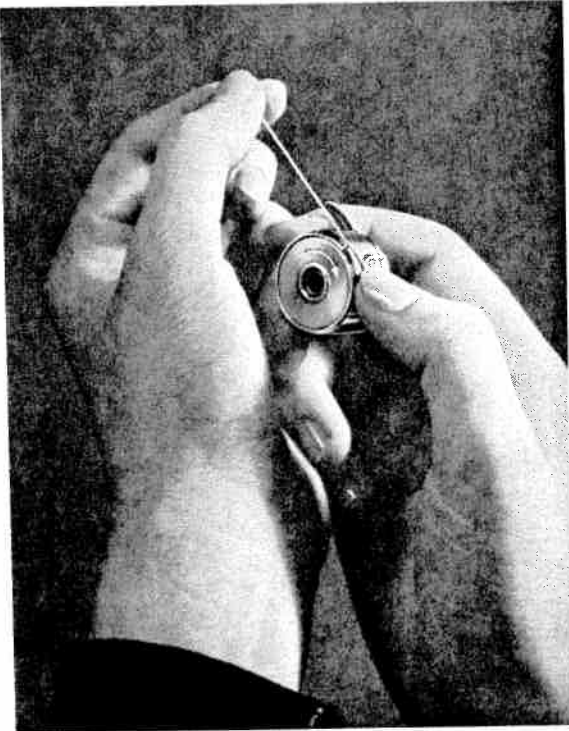


Photo 9



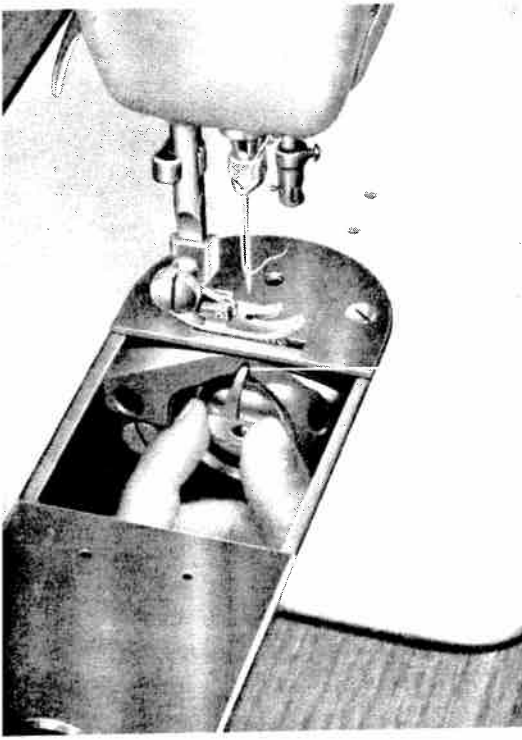
Retain bobbin in bobbin case and draw thread beneath the tension spring until it shows up again underneath the end of that spring.

Photo 10

old bobbin case with thumb and middle finger of your left hand; while the index finger holds the opened latch, bobbin cannot fall out.



Photo 11



Insert bobbin case on the central shuttle pin and release latch.

Turn bobbin case with thumb and index finger so that horn H engages in the recess.

Push till bobbin case clicks with an audible sound.

Photo 12

0. To thread the needle.

Pass the thread from reel 1 through the upper and lower hole of guide 2 between the tension discs 3 through take-up spring 4, then right-left through take-up lever 5, eyelets 6 and 7 and needle holder slot 8.

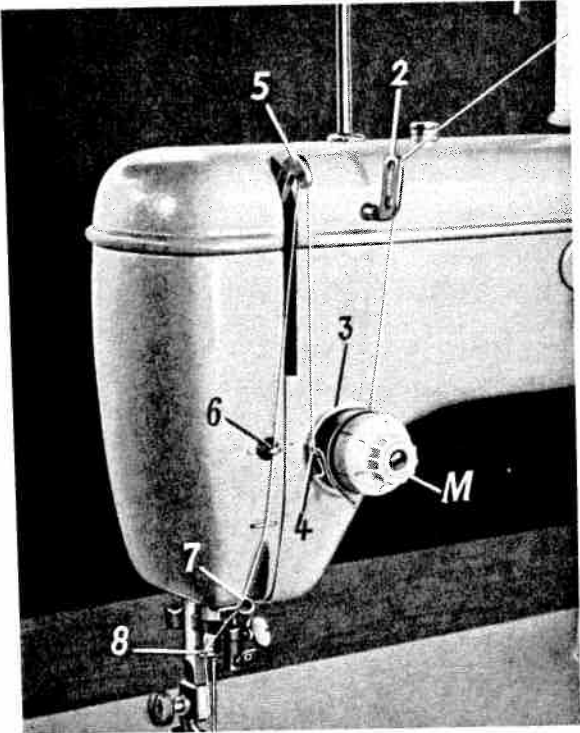
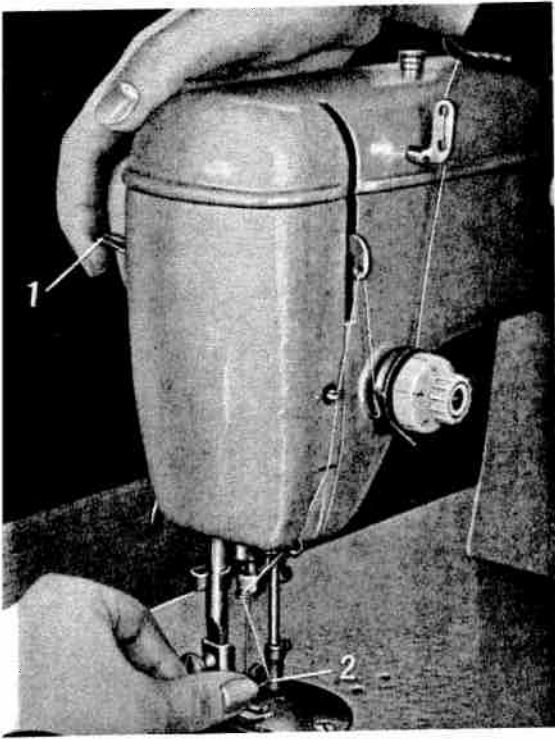


Photo 13

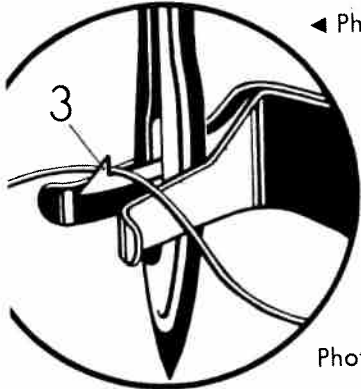


11. To operate the built-in needle threader.

1. Bring needle in highest position.
2. While right hand rests on the machine head, pull up lever 1 with middle and index finger until the needle threader hook has passed the needle eye and retain lever.
3. Guide thread end with the tip of the thumb around pin 2, holding it loosely above the protruding hook 3.

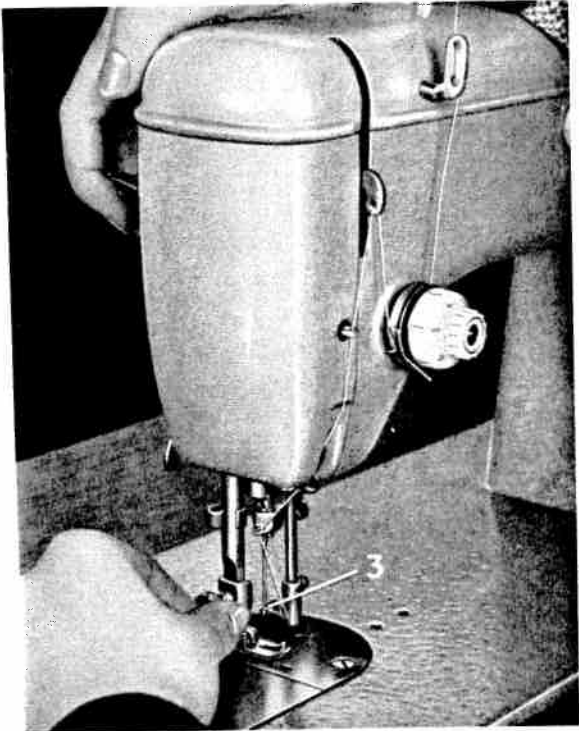
Photo 14

Make sure to place thread between needle eye and hook point 3 as below shown.



◀ Photo 16

Photo 15 ▶



4. Release lever 1

The thread is pulled through the needle eye by the reversing hook 3.

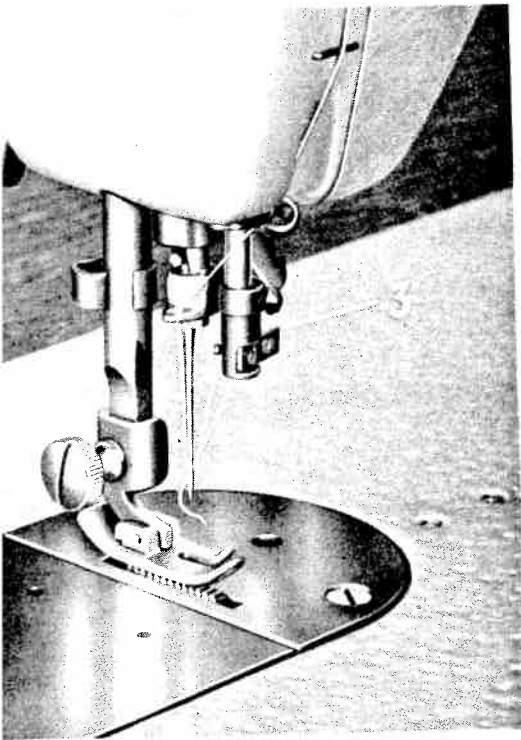


Photo 17

12. To draw up the underthread.

1. Hold the end of the upperthread.
2. Turn balance wheel until needle has once gone down and up again.
3. By slightly drawing up the upper thread, the underthread will come up in the shape of a loop through the hole in the needle plate.
4. Lay both threads back under the presser foot.

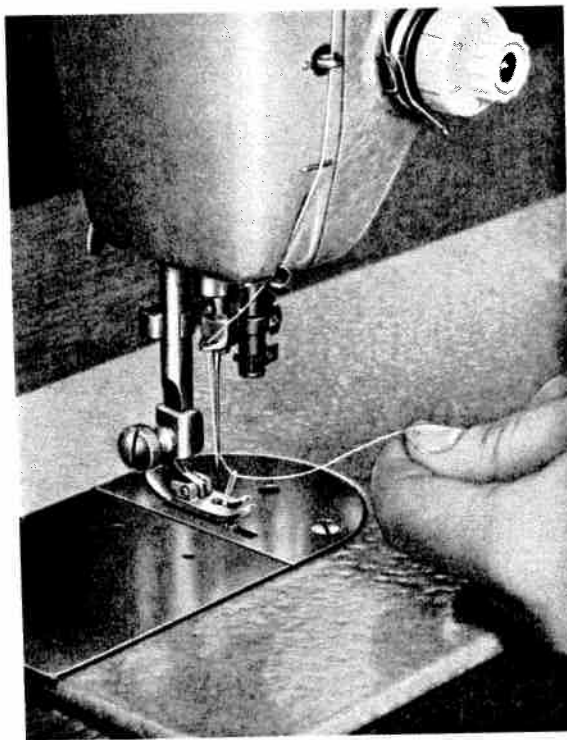
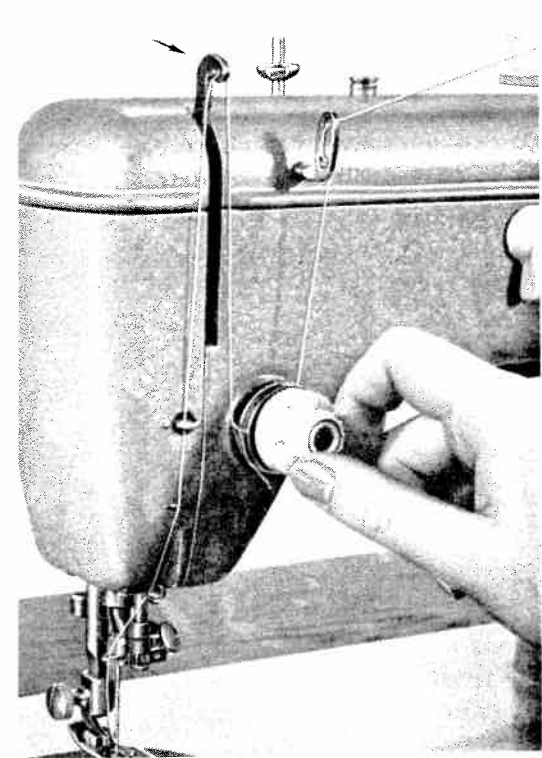


Photo 18



Important: **Make sure that the thread take-up is always in its highest position when beginning or ending a seam.**

In this manner you eliminate thread jamming and slip-offs of the upper thread. In this case you need not hold both threads when starting to sew.

13. To regulate the upper tension.

A turn to the right » will increase the tension for stitching thicker and heavier materials.

A turn to the left « will decrease the tension for stitching thinner fabrics.

Photo 19

4. To regulate the lower tension.

A lighter tension is obtained by left turns ◀ of the tension screw with the tip of the small screw driver. Right turns ▶ of that screw will increase the tension.

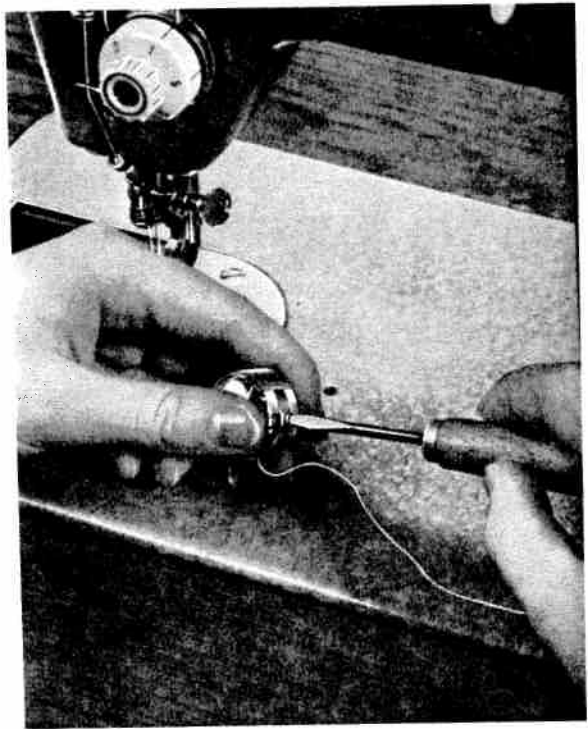


Photo 20

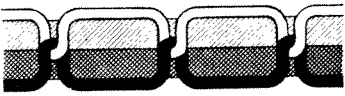


Photo 21
Perfect stitch

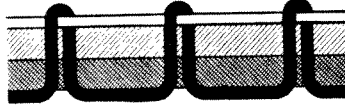


Photo 22
Upper tension too tight or
lower tension too weak

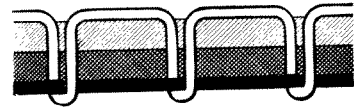


Photo 23
Upper tension too weak or lower
tension too tight.

15. Correct tension regulation

with perfect interlocking of upper and lower threads in the **centre** of the material results in neat and elastic seams.

16. To adjust the stitch length.

- 1. Set stitch length limitation lever B for the desired stitch length in accordance with the scale.
- 2. Push stitch regulation lever A to the right stop to obtain a forward stitch of the set length.
- 3. To shift to reverse stitching, turn lever A to the left stop.

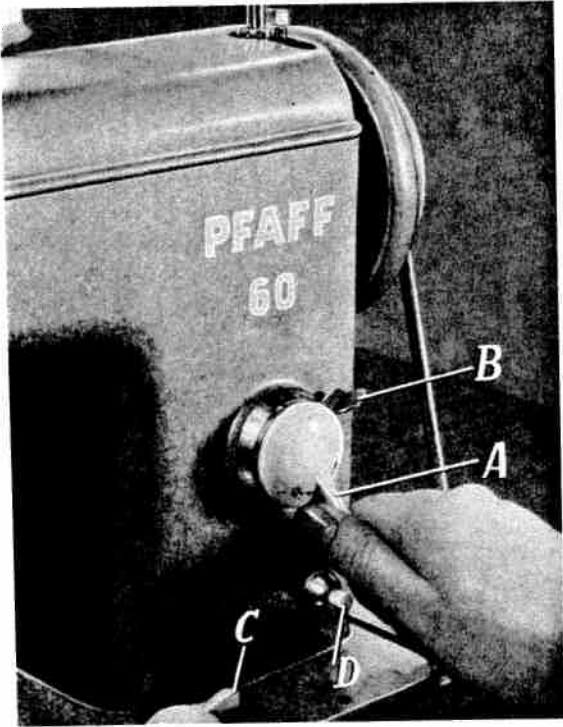
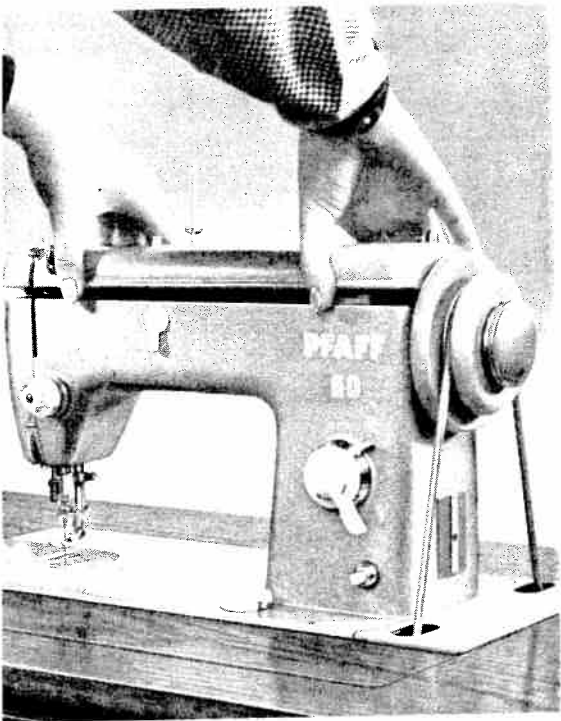


Photo 24



17. To remove the stop cover.

With all oil points covered up, **there is no soiling of the material!**

The one-piece top cover can be easily taken off with both hands.

Photo 25

18. Correct regulation of the pressure on the material

assures uniformity of stitch length and prevents injury of the material by the feeder.

A left turn ↶ of screw V will ease the pressure for thin and flimsy fabrics; a right turn ↷ of that screw will increase the pressure for thick and heavy materials.

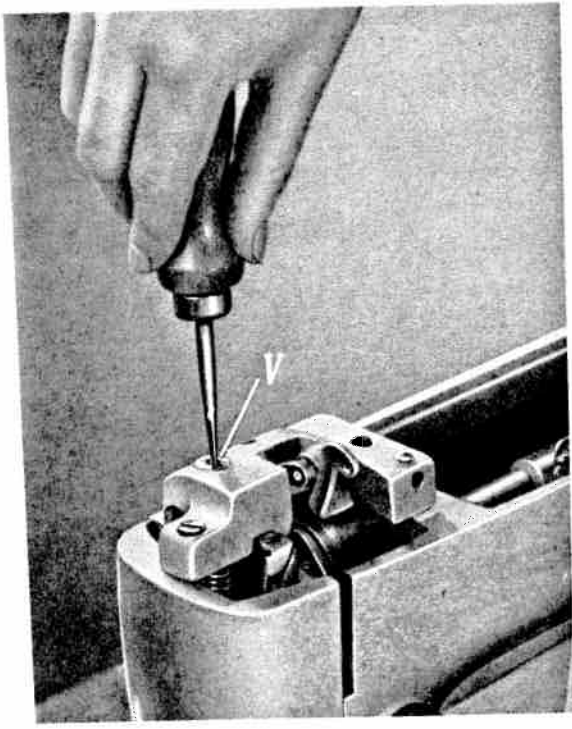
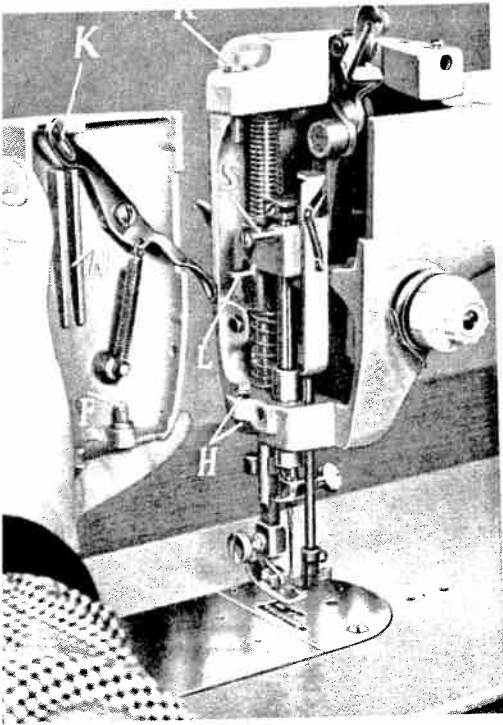


Photo 26



19. To take off the face plate

is only necessary when having to turn the presser bar for the proper fastening of attachments.

1. Remove screw k, let face plate slide downwards and while pushing it to the left, take it off.
2. When replacing make sure that part L engages in the notch N and pin S in the slot K.

When inserting the face plate, see that guide pin F catches in hole H.

Photo 27

10. To take off the balance wheel

for the removal of odd thread between
balance wheel and arm shaft bushing.

1. Loosen screw a.
2. Loosen milled screw b, turning it to
the left.
3. Lift carrier ring 1 (photo 29), take off
balance wheel and remove thread.

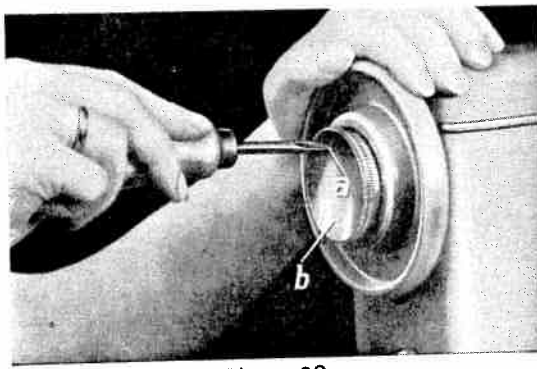


Photo 28

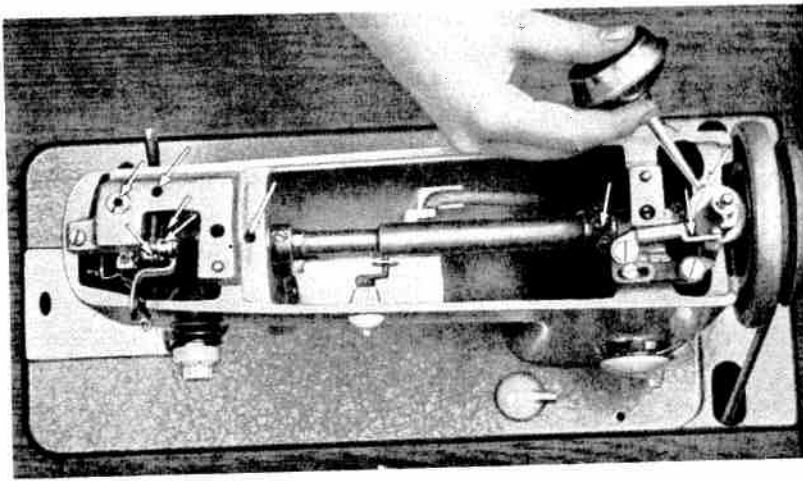


When replacing the carrier ring, make sure that its bentup parts face outside.

If the large milled screw should not tighten firmly, turn carrier ring for 180°.

Photo 29

Photo 30



21. Servicing and maintenance.

Regular and proper oiling serves to increase the life of your machine.

Apply oil only at the points marked by arrows.

Do not forget to oil the rear arm shaft bushing, half covered by the winder wheel.

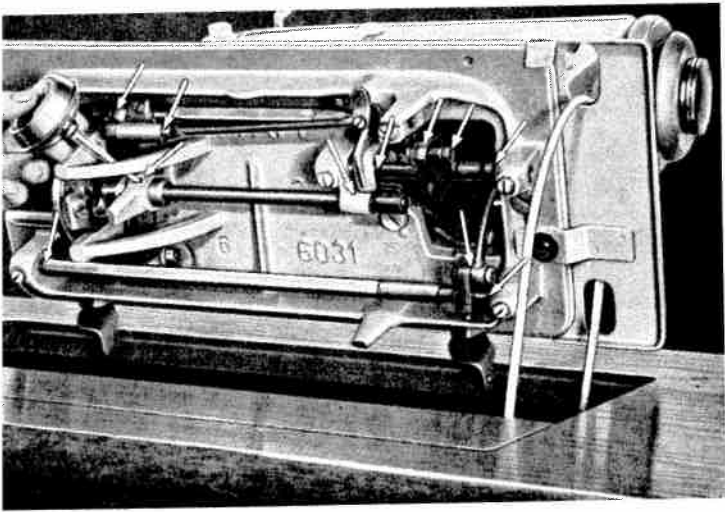


Photo 31

The oiling points underneath the machine

Brush off regularly lint and fluff between needle plate, feeder and shuttle!

Apply a drop of oil from time to time
on the race of the shuttle.

A dry race will wear off rapidly.

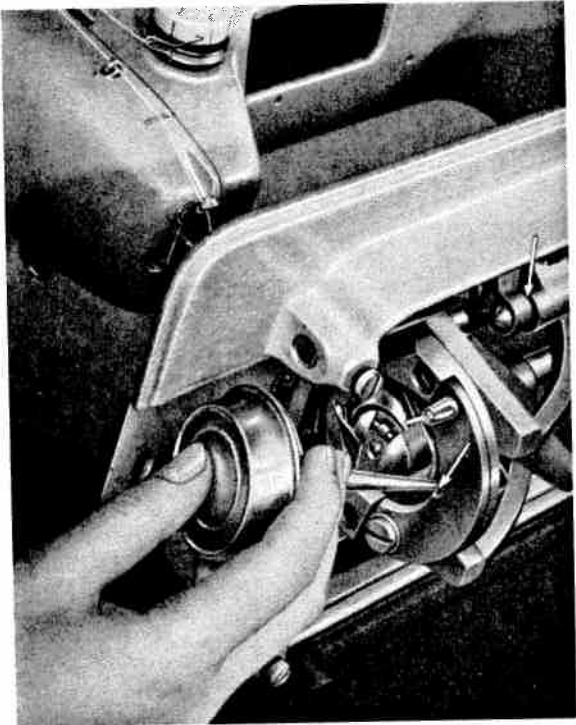


Photo 32

22. To remove the shuttle

becomes necessary when thread has entered into the race.

1. Loosen wing screw a and push bow b downwards.



Photo 33

2. Turn balance wheel so that the shuttle is at the extreme right.
3. Take off shuttle, holding it at the central pin.

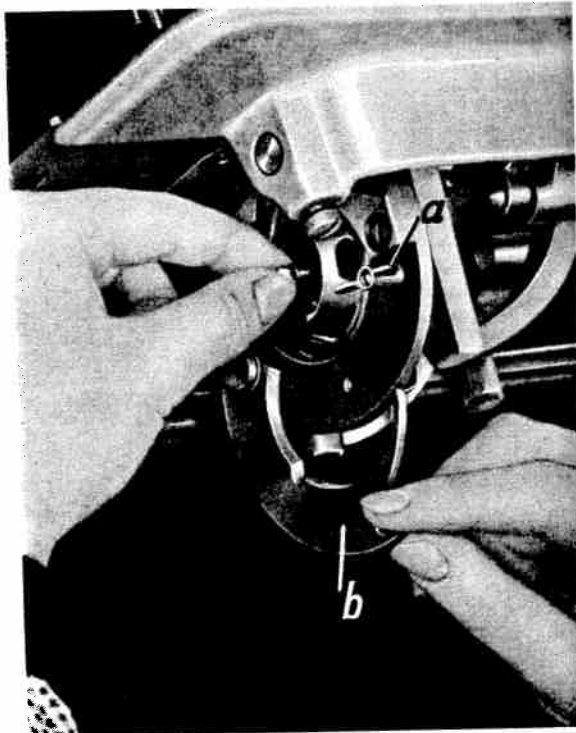
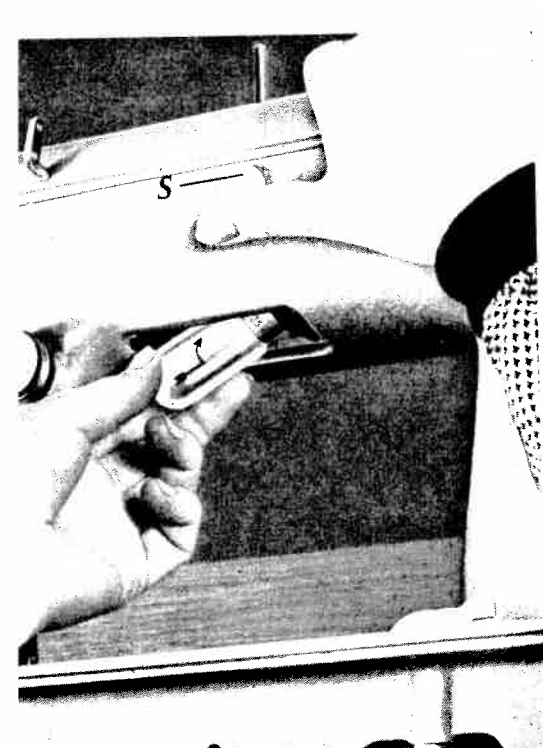


Photo 34



23. The sew light

is switched on and off by pressing push button D, located at the vertical arm (photo 4). The bulb has a bayonet cap and is held by a spring.

To exchange the bulb press lever S to the left and retain it there. Press the bulb into the socket, turning it slightly to the left and release it.

Photo 35

Insert a fresh bulb so that the guiding pins will easily slide into the slots of the socket.

Press slightly, then turn it shortly to the right. The bulb is now firmly secured.

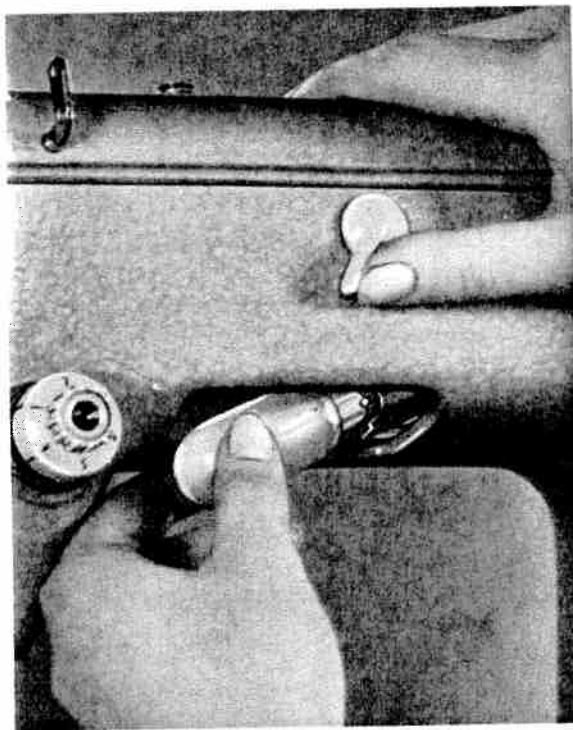


Photo 36

24. Hints for the detection and elimination of sewing trouble

Skipping of stitches:

Cause:

Needle improperly inserted.

Wrong needle is being used.

Needle is bent.

Machine not properly threaded.

Needle either too thin or too thick for the thread used.

Remedy:

Needle must be pushed up to the stop, with the long groove facing left.

The correct needle system is stamped on the bed plate slide.

Insert a new needle.

Check and correct threadening in accordance with chapter 10.

Select needle in accordance with the chart on page 6.

Thread breaking

Cause:
Thread breaking may occur for any of the aforementioned reasons.

Remedy:
See opposite page.

Thread tension too tight.

Adjust upper and lower tensions in accordance with chapters 13 and 14.

Use of inferior or knotty thread.

Only best sewing machine thread or a good quality of silk should be used.

Race being dry or odd threads having jammed the race.

Clean and oil race in accordance with chapters 21 and 22.

Thread having slipped off the reel.

Do not put the reel on the vertical but the horizontal reel holder.

Tightness of performance

Cause:

Drive belt being too long and slips off or too short, causing excessive pressure on the bearings.

Shuttle race being dry or obstructed by odd thread.

Mechanism is clogged up by inferior oil.

The feeder jams the needle plate.

The winder is engaged, braking the operation.

Thread has wound up between balance wheel and bushing.

Remedy:

Shorten belt and/or insert a piece for lengthening. Cut the belt straight, not on the bias.

Clean and oil shuttle race.

Use only PFAFF sewing machine oil, never salad oil or glycerin.

Unscrew both feeder and needle plate and readjust properly.

Disengage winder.

Remove and unwind thread with the aid of a thin needle.

Needle breakage

Cause:	Remedy:
Needle is bent and is hit by the point of the shuttle.	Replace needle at once to prevent more damage.
Needle being too thin or thread too thick.	Study needle and thread chart on page 6.
Upper thread tension being too tight, bending needle.	Either ease tension or use a thicker needle.
The needle is bent and hits needle plate due to the material being pulled or pushed.	Do not force the feeding movement, increase pressure on thicker material and so assure better feeding.
Bobbin case not properly inserted.	When inserting the bobbin case press until it clicks with an audible sound.

Ugly seams

Cause:

Tension not properly regulated.

Thread too heavy, knotty or hard.

Under thread unevenly wound.

Race to dry.

Odd thread having infested between the upper thread tension discs.

Remedy:

Adjust tension in accordance with chapters 13 and 14.

Use only a first-class type of thread.

For winding do not run the thread over your finger but over the winder thread tension.

Apply one or two drops of oil.

Loosen tension and remove thread.

Noisy performance

Cause:

Even or odd thread having infested in the race way of the shuttle.

Needle plate (after removal) not properly inserted.
Feeder jams needle plate cut-outs.

Machine has run dry or inferior oil or kerosene have been used.

Remedy:

Clean and oil race way according to chapters 21 and 22.

Unscrew needle plate and if necessary, also feeder, then readjust.

Clean and oil machine in line with chapters 21 and 22.

Inaccurate feeding

Cause:

Feeder being arranged at too low a level so that the teeth will not come up enough from needle plate.

Lint and fluff having infested in between the dented rows.

Pressure on sewing being too weak for the material.

NB: If machine does not feed at all, see whether feeder is lowered or stitch regulator in zero position.

Remedy:

Have feeder raised so that its teeth will fully project from the needle plate.

Take off needle plate and remove lint, using a graver.

Increase pressure by tightening screw V (chapter 18).

How to use the attachments

5. Edge stitching

With several parallel seams is easily done with the special guide No. 25820 in connection with the standard foot No. 43729.

Use the edgestitcher No.25553 if seams are to be taken closely to the edge.

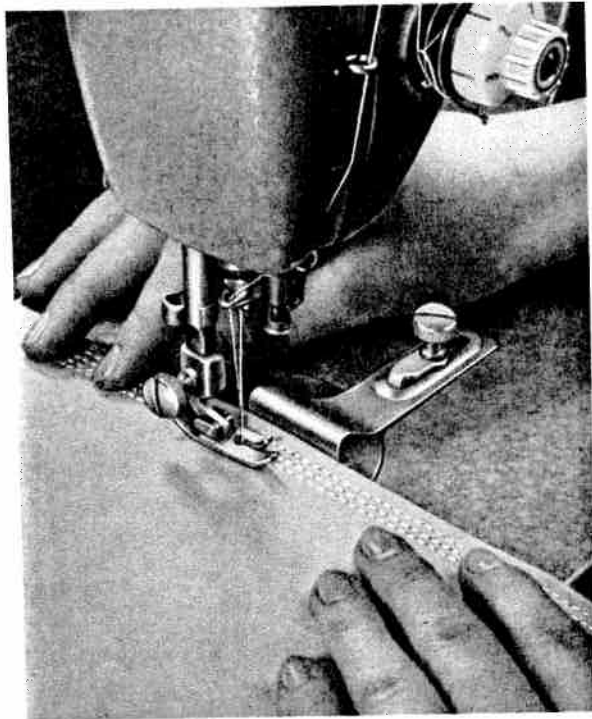


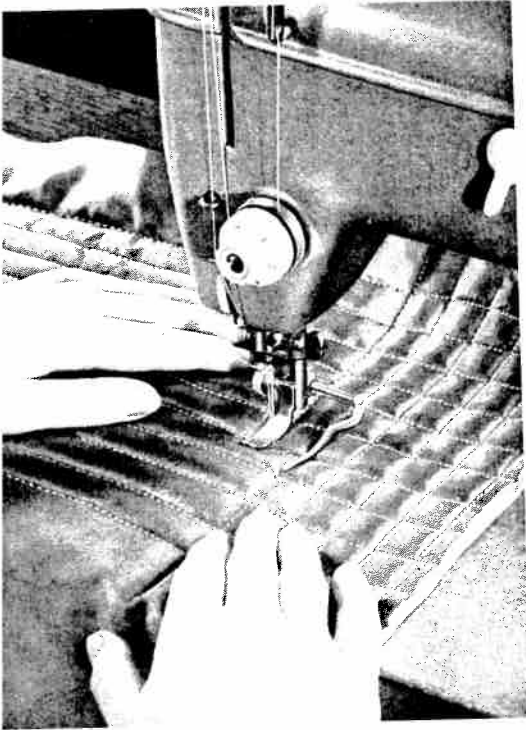
Photo 37

26. Quilting

The quilting guide No. 25553 is particularly suited for taking accurate rows of seams over the entire surface in both directions and at any distance from each other.

The guide is passed always along the preceding row.

Photo 38



ea-cosies, slippers, cushions, etc., are
just a few of many objects using the
quilting stitch.

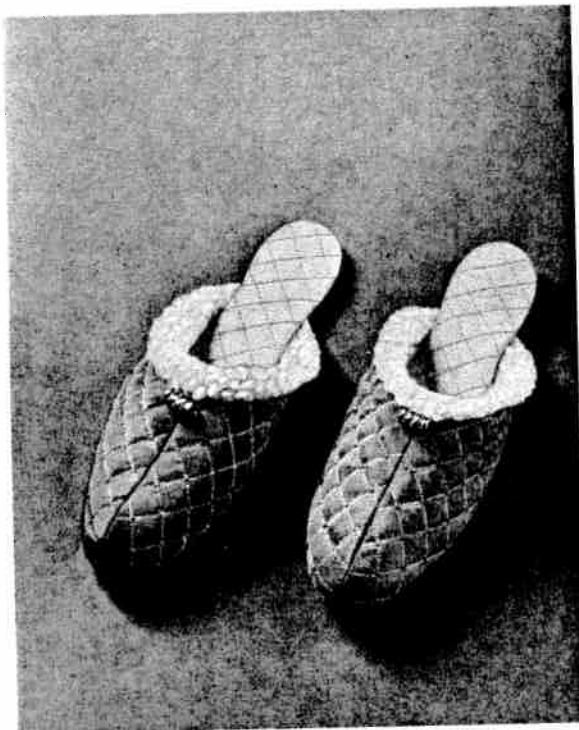


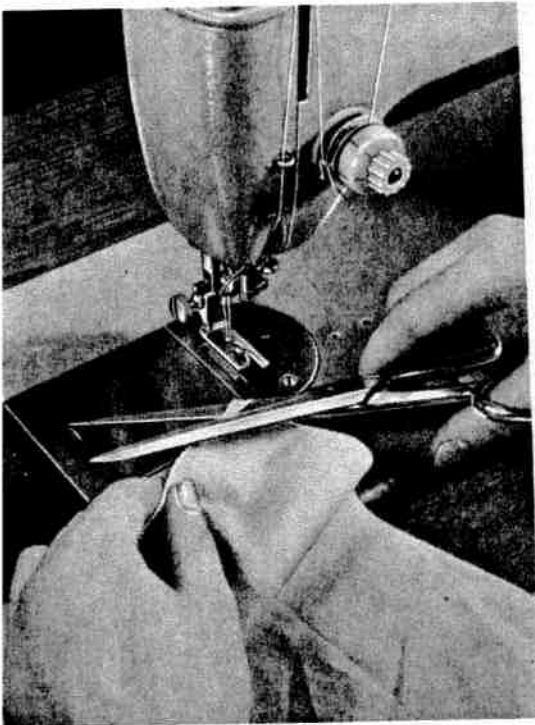
Photo 39

27. Hemming

Neat hems on handkerchiefs, underwear, etc. can be produced with the hemmers Nos. 25576 and 25579.

To facilitate insertion of the material in the hemmer, clip off the corner of the material.

Photo 40



Insert only as much material in the mouth of the hemmer as is required for guiding the folded edge of the material along the left edge of the hemmer.

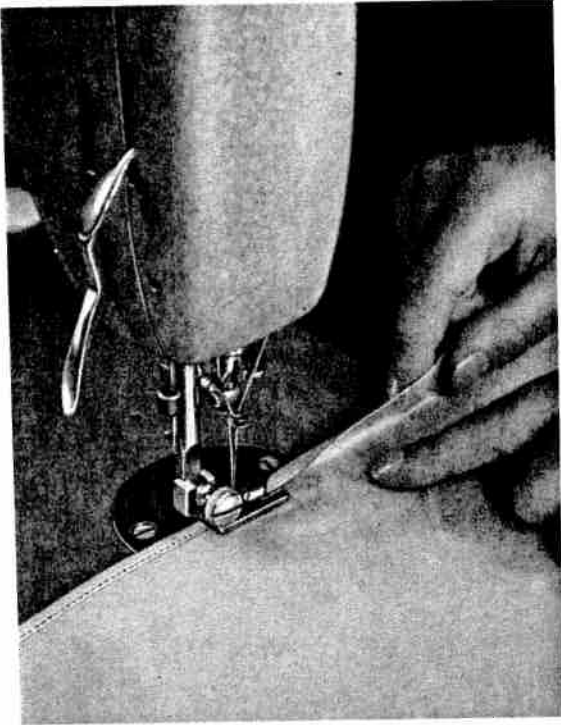


Photo 41



To avoid ugly corners at the end of the seam, slightly press down the material for an inch or so before the end of the seam to slow down the feeding motion a little.

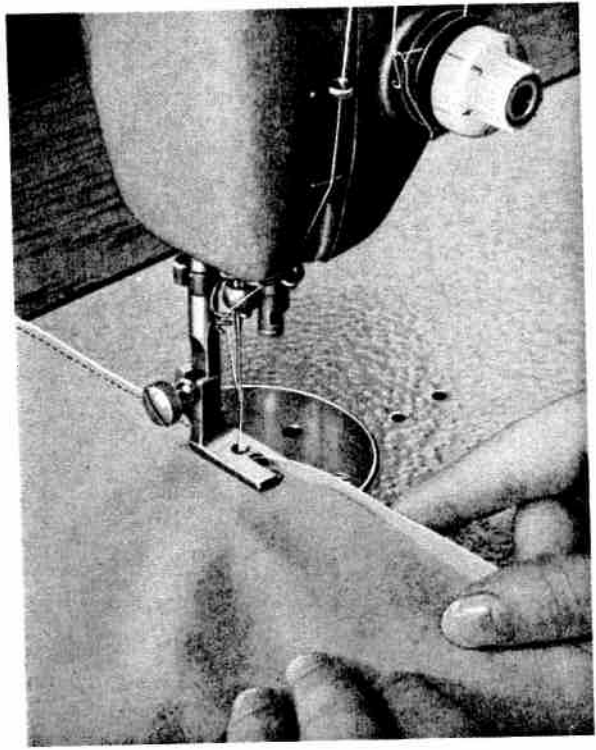
Photo 42

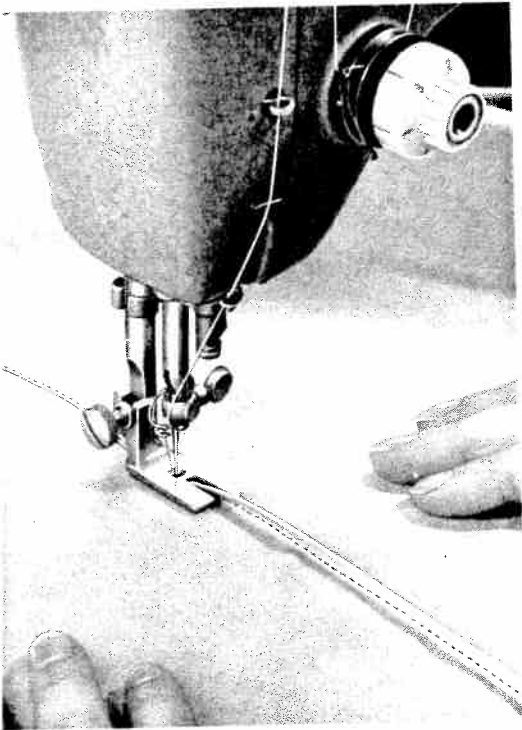
18. The folder No. 25 594

erves to durably join 2 plies of material
n 2 operations.

irst seam: Place both layers on top of
ach other with the right side facing
nwards so that the lower edge projects
n a width of abt. 1/6 of an inch. Make
ure that the projecting edge is only
olded once and then stitched.

Photo 43





Second seam: Unfold both plies, run the upstanding edge through the folder and stitch down to the left.

Photo 44

29. The ruffling attachment

No. 25547

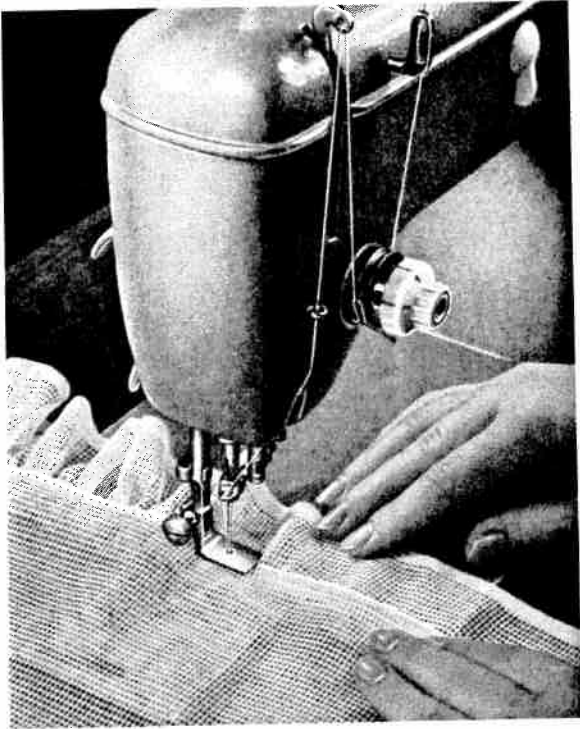
(at an extra charge)

s used for 3 purposes:

- 1. For the ruffling of the lower ply whereby the unruffled upper ply is passed through the slot of the foot.

The more or less of the ruffling of the lower ply depends on the feeding movement.

Photo 45





2. Instead of an upper ply, a ribbon is used and fed through the guiding of the foot. Stitching this ribbon along both edges will result in durable ruffles for subsequent application of ribbons with eyelets or hooks.

Photo 46

3. Attractive ruffling effects on a single ply will be obtained by overseaming with the ruffling foot (as used on curtains, etc.)

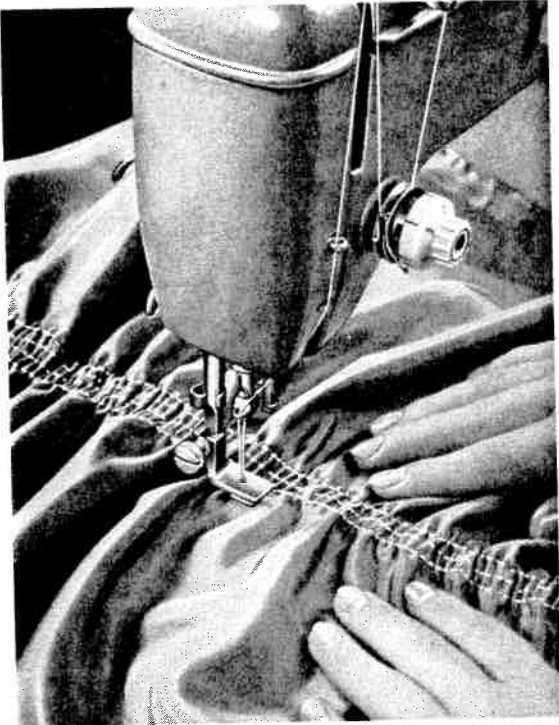


Photo 47

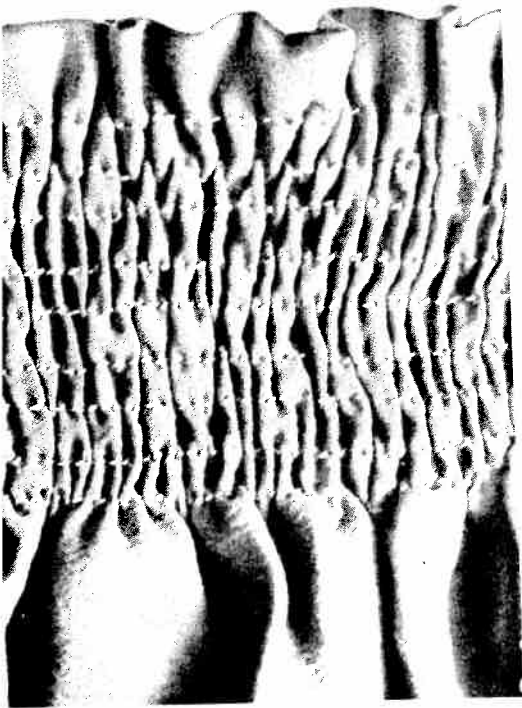
30. Elastic ruffling

on blouses, children's dresses, aprons, etc., is easy to accomplish by using thin elastic thread in the bobbin.

The elastic thread must be wound firmly around the bobbin.

After an appropriate regulation of the bobbin case tension, simultaneous stitching of 2 or 3 threads is possible.

Photo 48



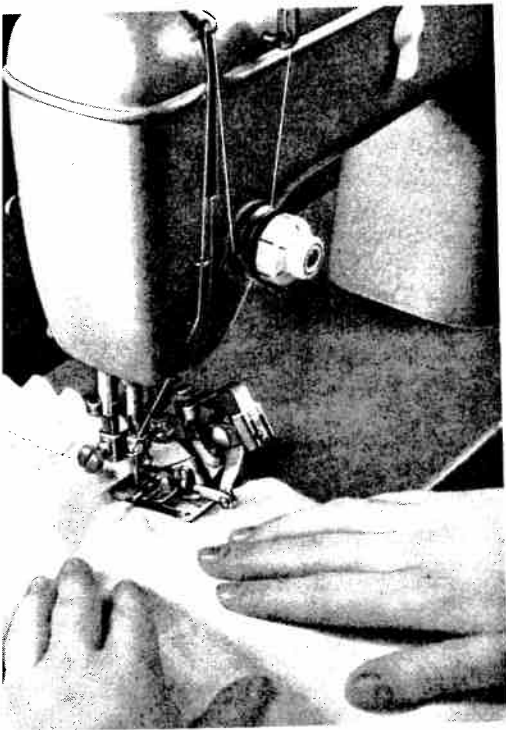
**11. The PFAFF 5-stitch-ruffler
No. 50100**

(at an extra charge)

This will permit ruffling and straight stitching at will. Moreover, it can be set for making a ruffle at each single stitch or at every 5th stitch.



Photo 49



Broad ruffles may be stretched or ironed to pleats.

Generally, the attachment lends itself to the making of left folded ruffles. For right-folded ruffles or for ruffling of large surfaces, the special ruffling plate supplied with the attachment is to be used.

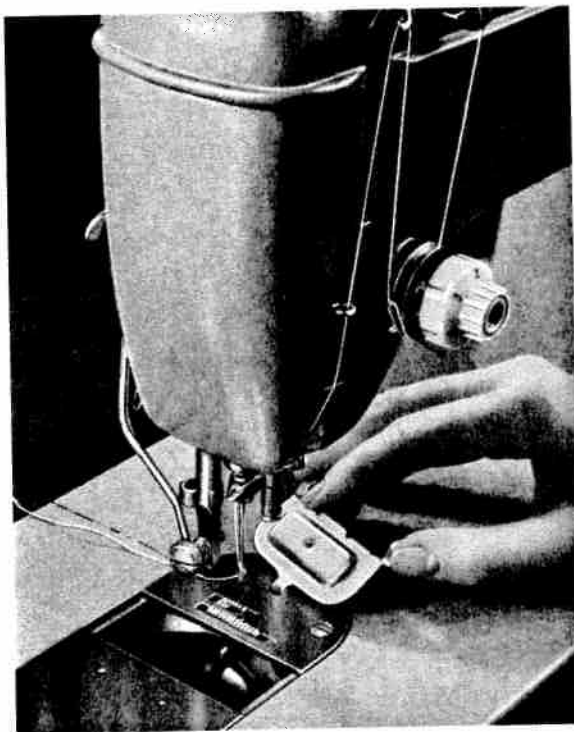
Photo 50

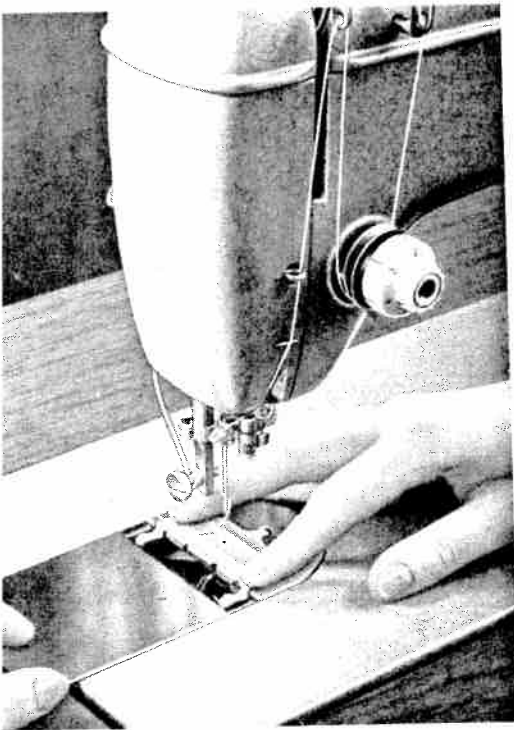
32. Darning and mending

Preparing for mending:

1. Take off presser foot and lower the feeder. To do this, turn lever c (photo 4) to the front.
2. Insert feed cover plate No. 25 997 as shown in photo 51 and secure it according to photo 52 with the bed plate slide.
3. Screw on darning attachment Nr. 53003.
4. Suspend presser bar with hook No. 46128 on face plate.

Photo 51





5. Release presser bar lever.
6. Insert and stretch defective material in hoop.

The feed cover plate facilitates the guiding and increases the tension of the material.

Photo 52

The presser bar lever of the suspended presser bar must point downwards as otherwise the upper thread tension would be disengaged.

The timely mending of thin spots with short stitches will prevent holes!

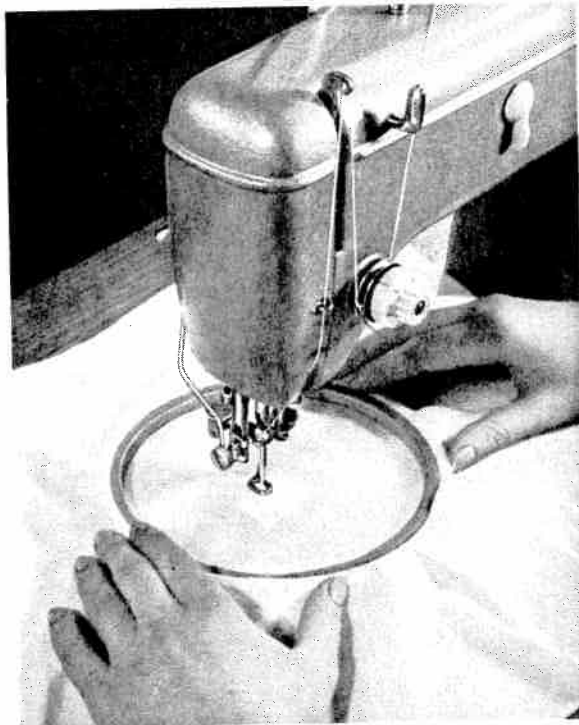


Photo 53



Fill angular cuts with darning stitches taken closely in both directions.

Photo 54

If the holes are small, cut out the defective piece, following the texture threads. First place the threads in one direction with the machine operating at high speed and then follow with smallest darning stitches taken in the other direction.



Photo 55



If the holes are big, it is advisable to insert a piece of the same material.

The patch is cut to size and fastened along the cut edges.

In the case of very large holes, the patches are stitched as shown on photo 56.

Photo 56

33. Embroidering

For embroidering, the machine is adjusted in the same manner as for mending.

The material is stretched in the hoop and then guided under the needle in accordance with the design.

As a preliminary exercise, slow treadling of the machine is recommended. Until the necessary practice is acquired, select only a plain linear design and see that the lines are filled in properly.

Attend one of the free embroidery courses of your PFAFF dealer to get acquainted with the various embroidery styles.